

CLAIMS

1. An industrial fabric comprising a woven fabric body having opposing ends, the fabric body having at least two systems of vertically stacked machine direction warp yarns interwoven with at least one system of cross machine direction weft yarns; on each end of the fabric at least some of the warp yarns form a first set of loops each of which is at a first angle to the machine direction; at least some of the warp yarns form a second set of loops each of which is at a second angle to the machine direction and each of which second set of loops is substantially concentric with the first set of angled loops to provide double end loops.

2 A paper makers fabric, for use in the dryer section of a paper making machine, the fabric having a machine side, a paper side, and a machine direction, and having opposite ends each of which ends includes seaming loops, the fabric comprising in combination:

a first set of monofilament warp yarns located in the machine direction,

a second set of mono filament warp yarns located in the machine direction,

and

at least one set of monofilament weft yarns located in the cross machine direction,

the two sets of warp yarns and the weft yarns being interwoven to a repeating weave pattern in which:

the first set of warp yarns provides exposed floats on the paper side of the fabric,

the second set of warp yarns provides exposed floats on the machine side of the fabric, and

each of the yarns of the first set interweave with a weft yarn to form a knuckle between the weft yarn and an exposed float in the second set,

each of the yarns of the second set interweave with a weft yarn to form a knuckle between the weft yarn and exposed float in the first set, and the first set of monofilament warp yarns is located in the weave pattern directly above the second set of monofilament warp yarns

wherein

a first set of seaming loops comprises the exposed ends of each of the first set of warp yarns bent to form a first set of loops each of which is at a first angle to the machine direction and the remainder of each exposed warp yarn end is rewoven into the next adjacent warp path of a warp yarn from the second set of warp yarns and in correlation with the weave pattern of that next adjacent warp path; and a second set of seaming loops comprises the exposed ends of each of the second set of warp yarns bent to form a second set of loops each of which is at a second angle to the machine direction, each of which second set of loops is substantially concentric with the first set of angled loops and the remainder of each exposed warp yarn end is rewoven into the next adjacent warp yarn path from the first set of warp yarns and in correlation with the weave pattern of the fabric.

3. A fabric according to Claims 1 or 2 wherein the first set of angled loops and the second set of angled loops are created in adjacent warp yarns.

4. A fabric according to Claims 1 or 2 wherein the first set of angled loops and the second set of angled loops are created in adjacent warp yarns and each set of loops is created in 50% of the warp yarns in the system of warp yarns.

5. A fabric according to Claims 1 or 2 wherein the first angle, the second angle and the third angle are similar.

6. A fabric according to Claims 1 or 2 wherein the first angle and the second angle are not in the same direction 5 relative to the machine direction.

7. A fabric according to Claims 1 or 2 wherein the first angle and the second angle are in the same direction relative to the machine direction.

8. A fabric according to Claims 1 or 2 wherein, in a pair of opposed fabric ends prepared for a coil seam, the direction of the first angle, the second angle and the third angle relative to the machine direction is chosen to match the direction of the spiral angle in the coil to be used to close the seam.

9. A fabric according to Claims 1 or 2 wherein, in a pair of opposed fabric ends prepared for a pin seam, the direction of the first angle, the second angle and the third angle relative to the machine direction on each fabric end is chosen to facilitate interdigitation of the two sets of loops on the fabric ends.